



and a remainder as Ni and unavoidable impurities,

wherein a quantity of C amongst said unavoidable impurities is restricted to 0.05% or less.

5. (Withdrawn) The Ni based alloy of claim 4 further comprising Mo: 0.1% to 2%.

6. (Withdrawn) The Ni based alloy of claim 4 further comprising Fe: 0.05% to 1.0% and Si: 0.01% to 0.1%.

7. (Withdrawn) The Ni based alloy of claim 4 further comprising Mo: 0.1% to 2%, and at least one of Fe: 0.05% to 1.0% and Si: 0.01% to 0.1%.

8. (Withdrawn) A member for a supercritical water process reaction apparatus, wherein said member comprises a Ni based alloy according to claim 4.

9. (Withdrawn) A Ni based alloy with excellent resistance to stress corrosion cracking in supercritical water environments containing inorganic acids comprising:

Cr: from more than 36% to less than 42%, and W: from more than 0.01% to less than 0.5%, further comprising Mg: 0.001% to 0.05%, N: 0.001% to 0.04%, and Mn: 0.05% to 0.5%, wherein the Mg, N and Mn are jointly incorporated such that the crystal phase stability of the Ni fcc lattice is improved;

and a remainder as Ni and unavoidable impurities,

wherein a quantity of C amongst said unavoidable impurities is restricted to 0.05% or less.



16. (Withdrawn) The Ni based alloy of claim 9 further comprising Nb: from more than 1.0% to 6% or less, at least one of Mo: from 0.01% to less than 0.5% and Hf: 0.01% to 0.1%; and at least one of further comprising Fe: 0.1% to 10% and Si: 0.01% to 0.1%.

17. (Withdrawn) A member for a supercritical water process reaction apparatus,  
wherein said member comprises a Ni based alloy according to claim 9.

18. (Withdrawn) A Ni based alloy with excellent resistance to stress corrosion cracking in supercritical water environments containing inorganic acids comprising:

Cr: from more than 28% to less than 34%, and W: from more than 0.1% to less than 1.0%,  
and;

further comprising Mg: 0.001% to 0.05%, N: 0.001% to 0.04%, Mn: 0.05% to 0.5%,  
wherein the Mg, N and Mn are jointly incorporated such that the crystal phase stability of the Ni fcc lattice is improved;

and a remainder as Ni and unavoidable impurities,  
wherein a quantity of C amongst said unavoidable impurities is restricted to 0.05% or less.

19. (Withdrawn) The Ni based alloy of claim 18, further comprising Nb: from more than 1.0% to 6% or less.

20. (Withdrawn) The Ni based alloy of claim 18 further comprising at least one of Mo: from 0.01% to less than 0.5% and Hf: 0.01% to 0.1%.

21. (Withdrawn) The Ni based alloy of claim 18 further comprising Fe: 0.1% to 10% and Si: 0.01% to 0.1%.

22. (Withdrawn) The Ni based alloy of claim 18 further comprising Nb: from more than 1.0% to 6% or less; and at least one of Mo: from 0.01% to less than 0.5% and Hf: 0.01% to 0.1%.

23. (Withdrawn) The Ni based alloy of claim 18 further comprising Nb: from more than 1.0% to 6% or less, Fe: 0.1% to 10% and Si: 0.01% to 0.1%.

24. (Withdrawn) The Ni based alloy of claim 18 further comprising at least one of Mo: from 0.01% to less than 0.5% and Hf: 0.01% to 0.1%; and further comprising Fe: 0.1% to 10% and Si: 0.01% to 0.1%.

25. (Withdrawn) The Ni based alloy of claim 18 further comprising Nb: from more than 1.0% to 6% or less; at least one of Mo: from 0.01% to less than 0.5% and Hf: 0.01% to 0.1%; and further comprising Fe: 0.1% to 10% and Si: 0.01% to 0.1%.

26. (Withdrawn) A member for a supercritical water process reaction apparatus, wherein said member comprises a Ni based alloy according to claim 18.

wherein the quantity of N is within a range from 0.001% to 0.012% in weight basis.